



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 2  
290 BROADWAY  
NEW YORK, NY 10007-1866

JAN 31 2012

Mr. John J. Donahue  
Superintendent  
Delaware Water Gap National Recreation Area &  
Middle Delaware National Scenic and Recreational River  
HQ River Road, off Rt. 209  
Bushkill, PA 18324

Dear Superintendent Donahue:

The Environmental Protection Agency's (EPA) Regions 2 and 3 have reviewed the National Park Service's (NPS) Draft Environmental Impact Statement (EIS) for the Susquehanna to Roseland 500-kV Transmission Line Right-of-Way and Special Use Permit, in accordance with our authorities under Section 309 of the Clean Air Act, as amended (42 U.S.C 7609, PL 91-604 12 (a), 84 Stat. 1709), and the National Environmental Policy Act (NEPA).

PPL Electric Utilities Corporation and Public Service Electric and Gas Company (the applicant) owns and operates an existing 230-kV line with a right-of-way (ROW) ranging from 100 to 380 feet wide through the Delaware Water Gap National Recreation Area, Appalachian National Scenic Trail and Middle Delaware National Scenic and Recreational River in Pennsylvania and New Jersey. The applicant is seeking to increase its transmission capabilities by adding a 500-kV line to the existing 230-kV line. The Draft EIS addresses that portion of the Susquehanna to Roseland transmission line that passes through the National Park system. Accordingly, the Draft EIS's evaluation is limited to the applicant's request to construct a double 500-kV power line across three units of the National Park system and examines how the proposed project would affect the purposes and resources of the Park units. EPA notes that the upgrade of the existing line does not initiate another federal action that would require an environmental impact statement on the entire transmission line.

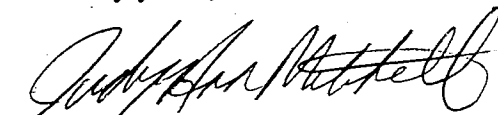
The applicant's final construction plan proposes to utilize the existing ROW, access the ROW through existing natural and cultural areas, construct new and taller power line towers and remove and replace the existing 230-kV line, with an additional 500-kV power line. The Draft EIS evaluates six alternatives, including a no-action alternative. The Draft EIS indicates that Alternative 2 (the applicant's proposed route), Alternative 2b (the applicants alternate proposal in that route) and Alternative 3 would likely result in significant adverse impacts to wetlands and water quality. In addition, there is limited information presented concerning mitigation measures that would either minimize or compensate for those adverse impacts. EPA is also concerned that Alternative 3 may include significant impacts to the Worthington State Forest, which are not included in the Draft EIS.

As NPS has not identified a preferred alternative, it is EPA's practice to rate the environmental impacts of all alternatives. Based primarily on potential impacts to wetlands and water quality, we have rated Alternatives 2, 2b, and 3 as "Environmental Objections" (EO). Alternatives 4 and 5 would have fewer impacts, and are rated as "Environmental Concerns" (EC), and Alternative 1 ("No-Action") is rated as "Lack of Objections" (LO). With regard to the adequacy of the analysis, we have rated the DEIS as "Insufficient Information" - (2). While the Draft EIS provides useful information and analyses, we have identified several areas where the Final EIS can improve the analysis of the predicted impacts of each alternative.

Finally, EPA is aware that the applicant will be proposing to offer mitigation through the purchase and ceding of additional lands to the National Park. This mitigation should be fully discussed in the Final EIS including the amount of land being considered, the ecological and recreational value of these areas, and the ability to replace or offset lost function and values of threatened resources. Methods to further avoid and minimize impacts to resources should be evaluated through the assessment process.

EPA recognizes the importance of land designated as a national park as an area protected and preserved for its ecological, historic, and recreational values. EPA looks forward to working closely with NPS in anticipation of publication of the Final EIS on these matters, and we are available to discuss our comments and recommendations included in our attached detailed comments. If you have any questions regarding our comments, please contact Lingard Knutson of my staff at (212) 637-3747.

Sincerely yours,

A handwritten signature in dark ink, appearing to read "Judy-Ann Mitchell". The signature is fluid and cursive, with the first name "Judy" and last name "Mitchell" being the most legible parts.

Judy-Ann Mitchell, Chief  
Strategic Planning & Multi-Media Programs Branch

Enclosure

## **EPA DETAILED COMMENTS**

### **NATIONAL PARK SERVICE DRAFT EIS SUSQUEHANNA TO ROSELAND 500-KV TRANSMISSION LINE RIGHT-OF-WAY AND SPECIAL USE PERMIT**

#### **Alternative 1**

Alternative 1 ("No Action") involves the denial of the applicant's ROW permit and the existing lines would continue to remain in place. However, should the transmission line be routed around the Park, adverse environmental impacts, which are not being evaluated under a NEPA process, could occur outside the National Park.

#### **Alternatives 2 and 2b:**

**Water Quality:** The Draft EIS states that the blasting needed for placement of the tower foundations may impact underground water flow paths due to enlargement from fracturing, as well as the likelihood of the formation of conduits and sinkholes and the risk that surface streams and wetlands may lose water to the subsurface. The actual extent and intensity of vibrations caused by blasting depends on several factors, including rock type and blasting techniques. In addition, groundwater withdrawal and diversion of surface water may cause aboveground and underground hydrologic systems to be eliminated, and drilling and blasting also create the possibility of groundwater contamination.

While EPA understands that NPS will require a geologic survey and a blasting plan prior to any construction along the proposed ROW, EPA recommends that additional data and appropriate modeling be included in the Final EIS to improve the analysis of impacts to groundwater and surface waters. This additional information is particularly important in the case of the limestone subsurface in the ROW of Alternatives 2 and 2b, as the Van Campens Brook and wetland complex has documented high resource values. EPA also notes that Van Campens Brook is a Category One stream under the New Jersey Department of Environmental Protection's water quality classification system in recognition of its exceptional ecological significance, including its value to native brook trout. We are concerned that an increase in total suspended solids (TSS) and/or a loss of flow will adversely affect not only native brook trout, but all species.

**Wetlands:** We understand that preliminary scoping and coordination has occurred with the U.S. Army Corps of Engineers, Philadelphia District (Corps), with respect to possible impacts to wetlands and waters of the United States, and that the Corps has made a preliminary determination that either a Nationwide Permit or SPGP-3 would apply to this project. We encourage NPS and the applicant to continue coordination with the Corps and other resource agencies, including EPA, Pennsylvania Department of Environmental Protection and New Jersey Department of Environmental Protection regarding permitting requirements. While the Draft EIS states that direct impacts to wetlands from fill are small, the indirect impacts to wetlands from blasting (discussed above) and conversion (vegetation removal) should both be quantified.

In addition, EPA does not believe the mitigation plan included in Appendix F provides sufficient information to determine whether impacts to wetlands are being fully mitigated; EPA recommends additional agency coordination to ensure a more comprehensive evaluation of wetland and stream impacts. Moreover, EPA recommends that practices used to minimize impacts to streams and wetlands be specified in the Final EIS, including all wetlands mitigation plans.

EPA also notes that Arnott Fen, within the ROW for Alternatives 2 and 2b, is considered a rare and unique wetland community, due in part to the underlying limestone bedrock. The hydrology of the Arnott Fen influences the array of species living in this rare community and includes numerous special-status wetland plant species that are not found anywhere else in the study area. In addition, Hogback Ridge also contains woodlands and a wetland considered a rare and unique community as it supports endangered species habitat and wetland plant species that are not found anywhere else in the study area, and is based on limestone bedrock. As stated above, any blasting may impact the hydrology and reduce the values of these exceptional wetlands, and should be discussed fully in the Final EIS.

EPA is concerned about the disagreement discussed in the Draft EIS between NPS and the applicant regarding the existing ROW agreement as to how the applicant would identify and remove “danger trees” and whether those actions, if permitted, might in effect increase the ROW beyond that defined in Alternative 2B. EPA recommends that before the Final EIS is released, the applicant’s existing ROW property rights be clarified.

### **Alternative 3:**

**Water Quality:** Most of the slopes along the Alternative 3 corridor range from 10 percent to 30 percent; there are relatively few areas with a slope less than 10 percent. In addition, a few areas with a slope of 40 percent to 50 percent occur along the proposed transmission line route. As more than 25 of the towers required for Alternative 3 would be constructed in areas with a slope of greater than 10 percent, blasting and excavation impacts to water quality must be evaluated. EPA recommends that modeling of possible landslides and erosion be included in the DEIS.

EPA is also concerned that the direct, indirect and cumulative impacts to all resources within the Worthington State Forest are not included in the DEIS. As the NPS, in Alternative 3, suggests placement of the line within the national park boundaries, and crossing into Worthington State Forest, it appears appropriate for the study to identify and analyze all environmental impacts to that area and include them in the Final EIS. We recommend that the Final EIS include an analysis of the potential impacts, and that NPS work with the New Jersey Department of Environmental Protection to ensure that the impacts are properly characterized.

### **Information Needs**

**Air Quality:** The Draft EIS states that all alternatives will have similar air quality impacts, however, no data is included to support this statement, nor does the Draft EIS discuss emissions mitigation (such as diesel particulate filters) from the diesel engines required to



construct and maintain the transmission line. EPA recommends that the Final EIS provide information on the levels of emissions and impacts to air quality. In addition, please note that Warren and Sussex Counties in New Jersey are designated as non-attainment for ozone, and that a General Conformity Applicability Analysis for each alternative in these counties will be necessary if a permit is approved.

**Water Quality:** The Draft EIS uses the U.S. Forest Service's Water Erosion Prediction Project (WEPP) model to estimate increased TSS concentrations. As the WEPP model did not detect differences between the alternatives, the topic of surface water and water quality was not carried forward in this Draft EIS. However, the Environmental Consequences section of the document states that "The increase of sediment loads and total suspended solids due to soil erosion from the construction and use of access roads and crane pads would also contribute to adverse impacts. An increase in sediment loads and turbidity could adversely affect the habitat, reproduction, respiration, and survival of fish and benthic macroinvertebrates and could bury or smother aquatic vegetation". EPA recommends that the WEPP model and its conclusions for all alternatives be included in an Appendix of the Draft EIS to allow for a more complete review of the model's conclusions.

**Environmental Justice:** EPA recommends that the Final EIS include the documentation by which the NPS determined that there would be no impact to minority or low-income populations. The environmental justice evaluation should identify any potentially at-risk communities that are inside the study area, identify the demographics of the communities, discuss census tract and census block group information, any minority or low-income populations within those tracts or block groups, and a discussion of activities, such as blasting, that might pose adverse risks or impacts to environmental justice populations.

**Cumulative Impacts:** While the Draft EIS discusses the cumulative impacts to individual resource types, we recommend that more detailed information be provided in the Final EIS, including an analysis of impacts to areas immediately outside the National Park units. The Draft EIS accurately indicates that an overall adverse cumulative impact can be expected from the upgrade of the line. It is unfortunate that the impacts of the complete Susquehanna Roseland transmission line will not be evaluated, and therefore the full degree of adverse cumulative impacts will not be identified, including those impacts that will occur from the generation of power being transmitted over the proposed upgraded line.

**Endangered Species:** As Alternative 2 and 2b, as well as other build alternatives will affect several the foraging and/or breeding areas of federally listed endangered species (e.g., Indiana Bat, bog turtle) and several state-listed species, we recommend that the Final EIS include more information on the potential impacts to endangered and threatened species, including the status of consultations with the U.S. Fish and Wildlife Service (FWS). If possible, EPA recommends that the FWS Biological Opinion be included in the Final EIS.

**Climate Change and Greenhouse Gas Emissions:** EPA recommends that the Final EIS provide quantitative information on the extent to which removal of mature forests associated with each alternative would impact the ability of the Park units to provide carbon sequestration benefits.

The NPS states that the park is a carbon sink, but the issues of the contribution of the alternatives to climate change through greenhouse gas emissions was dismissed from further analysis. However, forest preservation maintains carbon storage and forest management that increases carbon sequestration can augment forests' natural carbon storage capacity. (Perschel et al., 2003) Each alternative removes many acres of trees and vegetation that will affect the sequestration of carbon and should be discussed and differentiated in the Draft EIS in those terms.

**Landslides and Erosion:** EPA recommends that modeling of possible landslides and erosion are included in the Final EIS.

**Impacts to Worthington State Forest (New Jersey):** The direct, indirect and cumulative impacts to resources within the Worthington State Forest are not included in the Draft EIS.